



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER OF PATENTS AND TRADEMARKS  
Washington, D.C. 20231  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/089,162	03/27/2002	Guy Lumia	220986USOPCT	9784

22850 7590 04/21/2003

OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT, P.C.  
1940 DUKE STREET  
ALEXANDRIA, VA 22314

EXAMINER

CARRILLO, BIBI SHARIDAN

ART UNIT PAPER NUMBER

1746

DATE MAILED: 04/21/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/089,162

Applicant(s)

LUMIA ET AL.

Examiner

Sharidan Carrillo

Art Unit

1746

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 17 October 2002.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-30 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-30 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 05, 06.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

### *Specification*

1. The following guidelines illustrate the preferred layout for the specification of a utility application. These guidelines are suggested for the applicant's use.

#### **Arrangement of the Specification**

As provided in 37 CFR 1.77(b), the specification of a utility application should include the following sections in order. Each of the lettered items should appear in upper case, without underlining or bold type, as a section heading. If no text follows the section heading, the phrase "Not Applicable" should follow the section heading:

- (a) TITLE OF THE INVENTION.
  - (b) CROSS-REFERENCE TO RELATED APPLICATIONS.
  - (c) STATEMENT REGARDING FEDERALLY SPONSORED RESEARCH OR DEVELOPMENT.
  - (d) INCORPORATION-BY-REFERENCE OF MATERIAL SUBMITTED ON A COMPACT DISC (See 37 CFR 1.52(e)(5) and MPEP 608.05. Computer program listings (37 CFR 1.96(c)), "Sequence Listings" (37 CFR 1.821(c)), and tables having more than 50 pages of text are permitted to be submitted on compact discs.) or  
REFERENCE TO A "MICROFICHE APPENDIX" (See MPEP § 608.05(a). "Microfiche Appendices" were accepted by the Office until March 1, 2001.)
  - (e) BACKGROUND OF THE INVENTION.
    - (1) Field of the Invention.
    - (2) Description of Related Art including information disclosed under 37 CFR 1.97 and 1.98.
  - (f) BRIEF SUMMARY OF THE INVENTION.
  - (g) BRIEF DESCRIPTION OF THE SEVERAL VIEWS OF THE DRAWING(S).
  - (h) DETAILED DESCRIPTION OF THE INVENTION.
  - (i) CLAIM OR CLAIMS (commencing on a separate sheet).
  - (j) ABSTRACT OF THE DISCLOSURE (commencing on a separate sheet).
  - (k) SEQUENCE LISTING (See MPEP § 2424 and 37 CFR 1.821-1.825. A "Sequence Listing" is required on paper if the application discloses a nucleotide or amino acid sequence as defined in 37 CFR 1.821(a) and if the required "Sequence Listing" is not submitted as an electronic document on compact disc).
2. The disclosure is objected to because of the following informalities: The specification is objected to because it fails to include the subheadings, as described above.

Appropriate correction is required.

***Claim Rejections - 35 USC § 112***

3. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

4. Claims 1-30 are rejected under 35 U.S.C. 112, first paragraph, as based on a disclosure which is not enabling. The limitations of 40-80 degrees Celsius and 100-300 bars, which define the "dense state" of the fluid are critical or essential to the practice of the invention, but not included in the claim(s) is not enabled by the disclosure. See *In re Mayhew*, 527 F.2d 1229, 188 USPQ 356 (CCPA 1976).

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. Claims 1-30 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 1 and 12 are indefinite because it is unclear what one of ordinary skill in the art would consider as a "dense fluid under pressure". The specification describes (p. 12, lines 7-13) the fluid in the dense state at a temperature of 40-80 degrees and pressure of 100-300 bars. However, claim 1 is indefinite because it describes a "dense fluid under pressure" at temperature and pressure limitations which are outside of the range described in the specification. Claims 1 and 12 are further indefinite because it is unclear what is meant by "cork-based". Claim 1 is further indefinite because it fails to positively recite a step of cleaning the cork, which is an essential feature of the instant invention. Claim 12 is indefinite because it

Art Unit: 1746

fails to positively recite a step of extracting the organic compounds. Claim 12 is further indefinite because it is unclear whether the co solvent is added under pressure.

Claim 4 is indefinite because it is unclear what is meant by "compression/decompression cycles". Claim 5 is indefinite for similar reasons. Additionally, the term "for example" and "few" are indefinite.

Claim 6 is indefinite because of the term "for example". It is unclear what is meant by "light alkanes". Claim 6 is indefinite because of the term "such as". Claims 7, 10-11 are indefinite because it is unclear whether the co-solvent is added under pressure.

Claim 8 is indefinite because of the term "for example" and "such as". Claim 9 is indefinite because of the term "such as" and "and/or". Claim 16 is indefinite because "water" and "aqueous" are equivalent terms in the art.

Claims 17-19 and 25-27 are indefinite because it is unclear what applicant is trying to claim. Claim 17 recites "the extraction", "the extracts", and "the gaseous fluid", the limitations of which lack positive antecedent basis. Claim 18 is indefinite because of the term "particularly" and "hot". Additionally "said extraction" lacks positive antecedent basis since claim 1 fails to recite an extraction step. Claim 19 is indefinite because "said extraction" lacks positive antecedent basis. It is also unclear whether the "shaping" is done before or after treatment with the dense fluid, or before the mechanical/chemical treatment. Claim 19 is further indefinite because "said optional mechanical and/or chemical treatment" lacks positive antecedent basis. Claim 19 is indefinite because of the and/or clause. Claim 25 is indefinite for reasons similar to claim 17. Claim 26 is indefinite for reasons similar to claim 18. Claim 27 is indefinite for reasons similar to claim 19.

Art Unit: 1746

Claims 20 and 28 are indefinite because it is unclear what is meant by "cork-based".

Claims 21 and 29 are indefinite because it is not further limiting. Claims 21 and 29 fail to describe a "manufacturing process". Additionally, the "extraction step" lacks positive antecedent basis.

Claim 22 is indefinite because it fails to describe the structural relationship among the components. For example, it is unclear the structural relationship between the pump, liquefier, separation means. The claim basically lists the components of the installation. It is unclear the purpose of the liquefier. Claim 22 is indefinite because it is unclear what is meant by "dense state". Additionally, the apparatus claim is dependent on a method. Claim 30 is indefinite for reasons similar to claim 22.

Claim 23 is indefinite because it fails to positively recite a step of disinfecting or making aseptic. It is unclear what is meant by "dense fluid" and "cork-based".

### ***Claim Rejections - 35 USC § 102***

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

8. Claims 22 and 30 are rejected under 35 U.S.C. 102(b) as being anticipated by Shrive et al. (WO 98/16216288).

Shrive et al. teach a means in the form of autoclaves for contacting the material to be

Art Unit: 1746

treated, liquefier means (16), a pump (5), a supercritical exchanger (7), separators (11, 12, 13) for separating the treated material from the extracted compounds, and means (15) for recycling. Since reference to a method cannot serve to distinguish an apparatus, the limitations are taught by Schrive et al. It has been held that a recitation with respect to the manner in which a claimed apparatus is intended to be employed does not differentiate the claimed apparatus from a prior art apparatus satisfying the claimed structural limitations. *Ex parte Masham*, 2 USPQ2d 1647 (1987).

9. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

10. Claims 1-8, 12-21, 23, 25-29 are rejected under 35 U.S.C. 102(a) as being anticipated by Taylor et al. (J. of Agricultural and Food Chemistry (200), 48 (6), 2208-2211).

Taylor et al. teach extracting trichloroanisole in cork using supercritical fluid extraction (Abstract). In reference to claims 1-3, and 6, refer to page 2209. In reference to claims 4-5 and in view of the indefiniteness, as described above, the limitations are met by Taylor. Further, Taylor et al. teach a first step of equilibrium in order to allow the temperature and pressure to reach the set values. The limitations are inherently met since after SCF, the temperature and pressure of the oven would have to be reduced to ambient conditions.

In reference to claims 7-8, 12, and 16, Taylor teaches the addition of methanol. In reference to claims 13-15, refer to the abstract and page 2211. In reference to claims 17, 21, 25, and 29, refer to pages 2209-2210. In reference to claims 18 and 26, Taylor teaches chemical

Art Unit: 1746

analysis by GC/HPLC of the sample after extraction (page 2209). In reference to claims 19-20 and 27-28, refer to the "Cork Dissection" on page 2210. . In reference to claim 23, the limitations are met since Taylor et al. teach extracting TCA from tainted cork, wherein the TCA is attributed to the musty mildew like aroma.

11. Applicant cannot rely upon the foreign priority papers to overcome this rejection because a translation of said papers has not been made of record in accordance with 37 CFR 1.55. See MPEP § 201.15.

12. In an interview with Mr. Stefan Koschmieder on 4/15/03, the examiner discussed the submission of a certified copy of a translation of the foreign priority document in order to overcome the rejection in view of the prior art of Taylor. The examiner discussed that claims 21-22 and 29-30 would not be allowable. The examiner discussed the 112, first and second paragraphs. However, no agreement could be reached.

13. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Staack Reis Machado teaches the extraction of ceroid fraction of cork smoker with supercritical fluid. However, the reference is not applicable as prior art in view of applicant's earlier filing date.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sharidan Carrillo whose telephone number is 703-308-1876. The examiner can normally be reached on Monday-Friday, 6:00a.m-2:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Randy P. Gulakowski can be reached on 703-308-4333. The fax phone numbers for



Art Unit: 1746

the organization where this application or proceeding is assigned are 703-305-7719 for regular communications and 703-305-7719 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-0661.

Sharidan Carrillo  
Primary Examiner  
Art Unit 1746

bsc  
April 17, 2003



SHARIDAN CARRILLO  
PRIMARY EXAMINER